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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/091,708	03/06/2002	Hansen Yuan	2153 CIP DIV	7922

530 7590 01/07/2005
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EXAMINER

PRIDDY, MICHAEL B

ART UNIT	PAPER NUMBER
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3732

DATE MAILED: 01/07/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/091,708

Applicant(s)

YUAN ET AL.

Examiner

Michael B Priddy

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 19 December 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-40 is/are pending in the application.
- 4a) Of the above claim(s) 10, 21, 36 and 38 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-9, 11, 13-18, 20, 22-26, 29, 32-34, 37 and 39 is/are rejected.
- 7) ☒ Claim(s) 12, 19, 27, 28, 30, 31, 34, 35 and 40 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 1/16/2002; 10/09/2002; 12/15/2003; 01/17/2004
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

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DETAILED ACTION

Election/Restrictions

Applicant's election without traverse of the species of group (I Figs. 1-6D) in the reply filed on 12/19/2003 is acknowledged. Applicant has indicated that claims 1-9, 11-20, 22-35, 37, 39 and 40 correspond to the elected species. Claims 10, 21, 36 and 38 are hereby withdrawn from further consideration.

Claim Objections

Claims 6, 8, 19, 26 and 28 are objected to because of the following informalities: in line 3 of claim 6, "an initial position" should be --the initial position--; in line 2 of claim 8, "recesses" should be --recess-- and in line 3, "an initial position" should be --the initial position--; in line 5 of claim 19, "recesses" should be --recess--; claim 26 should be amended to depend from claim 25 to provide antecedent basis for "the initial position"; and claim 28 should be amended to depend from claim 27 such that the "third recess" will follow the "second recess" of claim 27. Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

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Claims 6-8 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 6-8 each recite the limitation "the bottom surface" in line 1. There is insufficient antecedent basis for this limitation in the claims.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claim 15 is rejected under 35 U.S.C. 102(e) as being anticipated by Schläpfer et al. (U.S. 6,077,262). Schläpfer et al. teaches a device for securing a spinal rod to the spine comprising: a head portion 3a having a channel 6a extending therethrough defining a vertical axis and a horizontal axis, and configured to receive a spinal rod along the horizontal axis; a locking cap 7a configured for reception by the head portion 3a along a vertical axis of the channel 6a and adapted to engage an interior surface 24 of the channel 6a and an exterior surface of the spinal rod upon rotation of the locking cap 7a about the vertical axis through a 90° arc to secure the position of the head

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portion 3a relative to the spinal rod and a fastener portion 2a depending from the head portion.

Claims 1-6, 9, 13, 14, 16-18, 20, 22-26, 32, 33, 37 and 39 are rejected under 35 U.S.C. 102(b) as being anticipated by Schläpfer et al. (U.S. 5,520,689). Schläpfer et al. teaches a device for securing a spinal rod to the spine comprising: a head portion 3 having a channel 6 extending therethrough defined in part by a hemi-cylindrical seat for receiving a spinal rod, the channel 6 being bounded by opposed side walls 26, each side wall having an arcuate engagement slot 11 defined therein; a locking cap 7 having a bottom surface configured to accommodate a spinal rod extending through the channel 6 of the head portion 3 and including opposed arcuate engagement flanges 12 configured for cammed reception in the opposed arcuate engagement slots 11 of the head portion 3 upon rotation of the locking cap 7 relative to the head portion 3 to secure the position of the head portion 3 relative to the spinal rod; and a fastener portion 2 formed monolithic with and depending from the head portion 3; wherein the locking cap 7 is configured for rotation of at least 90°; wherein the bottom surface of the locking cap 7 includes a first elongate recess 13 oriented to accommodate a spinal rod; wherein the locking cap 7 includes a cylindrical head having a hexagonal bore 17 defined therein; wherein the opposed engagement slots 11 are each defined in part by inclined slot surfaces, with the angle of the inclined slot surface of one engagement slot 11 being opposite that of the opposed engagement slot 11, and the opposed engagement flanges 12 are each defined in part by inclined flange surfaces with the angle of the

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inclined flange surfaces of one engagement flange 12 being opposite that of the opposed engagement flange 12.

Concerning the language "configured for cammed reception" the Examiner has interpreted a cam as "a rotating or sliding piece in a mechanical linkage used especially in transforming rotary motion into linear motion or vice versa." The "threads" 12 of the locking head 7 of Schläpfer et al. are clearly capable of rotation and upon rotation do transform this rotation into linear motion of the head 7 along vertical axis 1.

It should also be noted that Schläpfer et al. indicates the bottom portion 2 may be either a pedicle screw or a spinal column hook (abstract).

Allowable Subject Matter

Claims 12, 19, 27, 28, 30, 31, 34, 35 and 40 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claims 7 and 8 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

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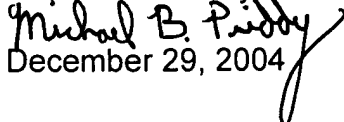
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michael B Priddy whose telephone number is (571) 272-4717. The examiner can normally be reached on Mon.-Fri. 8 a.m. - 5 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Shaver can be reached on (571) 272-4720. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Michael B. Priddy


December 29, 2004